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Effect of Technology Driven Built Environments on Collective Consciousness: Identifying Healing Spaces for Human Evolution in the spatiotemporal of the Metaverse

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ABSTRACT

The model and quality of housing, the neighbourhood in which one lives, and community social structures all affect one's physical and mental health. The exploratory research conducts a quantitative evaluation of human's attitudes towards different aspects of extended realities, metaverse and parallel universes. all Grounded on semi- structured interviews with 29 number of complete responses, the researcher assessed how the respondents perceive dealing and investing in intangible realities. Thematic analysis was around the "Attitude towards Extra-Natural Phenomena/ Extended Reality and the Metaverse". Respondents answered how the emerging terrain affected their productivity, mental health, physical health, and overall wellbeing. This study questions whether the way to wellbeing is to proceed in the road of virtuality and unreal environments and to which extent people are willing to invest in extended realities (XR) and met averse, SETI and METI, hence creating environments in these dimensions, to reach growth and human evolution.

Keywords: Housing, quality of life, built environment, human evolution, mental health, metaverse.

1. Introduction

The idea of hyperactive temporality is frequently brought up in both ancient Chinese and other cultures. Ancient Chinese myths and tales were the first to depict the hyperactive spatiotemporal. Hyperactive spatiotemporal has been elevated to a theoretical position in Taoism. Table6.1 demonstrates how the old Lao-Zhuang literature of the Taoists is a heterodoxy of the conventional understanding of spatiotemporal (Wang *et al.,* 2023).

These ancient Western classical concepts, such as Plato's "Triple World," Aristotle's "Theology," Hegel's "Absolute Idea," and so forth, likewise reflect hyperactive spatiotemporal (Wang *et al.,* 2023) Human acts occur in actual time and space in the real world. The usual course of events are guaranteed by spatiotemporal, but they are also constrained so that they cannot deviate from the true characteristics of spatiotemporal. Real-world time and space limitations are broken by the metaverse. There are two instances of time and space when the hyperactive spatiotemporal of the Metaverse can be used. 1) crossing the boundaries of time, going back in time, and going into the future; 2) crossing the boundaries of physical space, taking up space, and crossing spatiotemporal in a specific amount of time (Wang *et al.,* 2023).

1.1. The metaverse: An introduction to virtual reality, augmented reality and extended reality (VR, AR, XR) (Kasiyanto and Kilinc 2022).

The fact that the metaverse is a spacetime different from the real world reflects the hyperactive spatiotemporal nature of the metaverse. It goes beyond simply creating a static digital place and instead creates a virtual environment that changes over time, much like the dynamic real world. It offers humanity a new market opportunity and offers users a unique experience. With the support of technologies like the internet, 5G, virtual reality, and others, Metaverse is currently in a constant state

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of development. The opportunity to create a holographic digital environment that is similar to the traditional real world has been provided by the metaverse. It will be heavily utilized in education, diligence, and other industries in the future (Wang *et al.,* 2023) (Fig. 1).

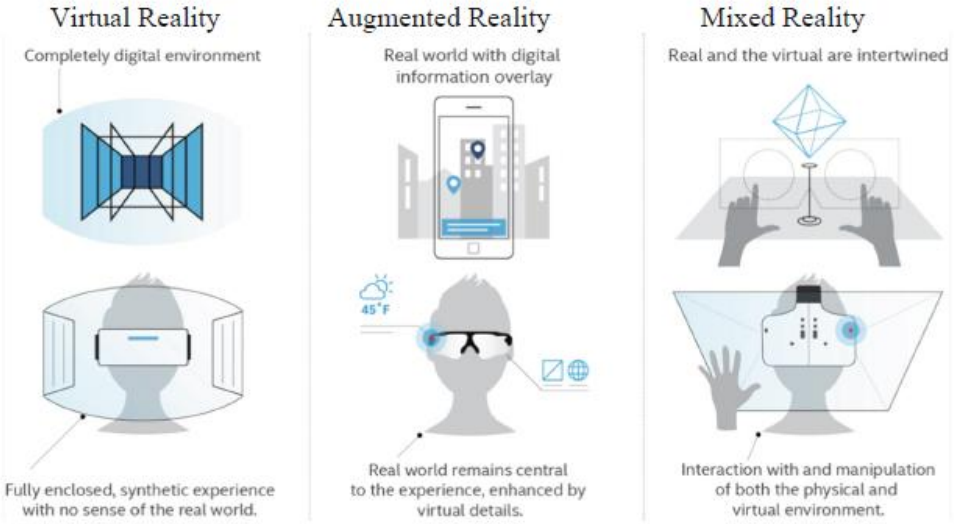

Fig. 1: The difference between Virtual Reality, Augmented Reality and Mixed Realities (Buhalis and Karatay 2022**)**

Since 2021, Metaverse has received extensive encyclopedic coverage and has been the hottest topic in the technological industry. This phrase describes a shared online environment that combines the actual and virtual worlds (physical, augmented, and virtual reality), which users can access using digital personas (Avatar). It provides a starting point for every user, giving a peaceful state where everyone can have their own perspective on the virtual world (Marzaleh *et al.,* 2022).

When employing an XR-intermediated information system, the NASA Task cargo indicator (NASA-TLX), which includes six sub-dimensions of frustration, performance, problem, physical, internal, and temporal demand, was utilized to measure private workload. The results show that whereas VR had no significant impact on any of the workload sub-dimensions, AR was highly associated with overall workload, particularly internal demand, and difficulties (Xi *et al.,* 2023). Technologists and forecasters have evaluated how the Metaverse might influence and advance healthcare services in the future. The World Health Organization (WHO) has used virtual reality to train COVID-19 representatives and internal health experts on how to use it to treat people with internal illnesses and emotional difficulties like post-traumatic stress disorder, phobias, anxiety diseases, visions, and visions. Additionally, it has been applied for educational reasons at medical seminaries. As a result, it appears that the Metaverse can be helpful to medical practitioners in many areas of their job that involve the usage of these technologies. (Marzaleh *et al.,* 2022)

The promotion of digitization has accelerated post-COVID-19 development. When Mark Zuckerberg, the CEO of social media giant Facebook, declared in October 2021 that the metaverse is the next great thing, a revolution of the Internet from its current state Web2.0 to the unborn stage of Web3.0.19, it has taken on a new position of development. In fact, the same CEO has renamed the Facebook company to Meta20 and promised to devote up to USD10 billion to the growth of the metaverse. People can behave, engage, and transact business with one another in this brand-new virtual world called the metaverse by employing incorporations. Someone spent USD 450 000 on virtual land in December 2021. Someone invested a significant amount of money-USD2.4 million-for a plot of land in the fashion district of a metaverse, next to the well-known Snoop Dogg. Although the metaverse's universe is virtual, its positive effects on the real world are evident and the lucrative deals are real (Kasiyanto and Kilinc 2022).

1.2. Anti metaverse Movement

Given that the metaverse is thought to be founded on openness and transparency, sequestration difficulties arise. However, the primary motivation for joining the metaverse is to engage in social interactions that involve the exchange of data and information with others. As the next generation of the Internet, the metaverse, develops, the dangers to cyber security have grown. Identity theft and financial losses brought on by a security breach are only two examples of similar traps (Kasiyanto and Kilinc, 2022). The growth of cryptocurrencies threatens the efficacy of central banks because maintaining price stability is the primary goal of the central bank. Cryptocurrencies are privately minted and distributed by organizations or groups not governed by a central bank (Kasiyanto and Kilinc, 2022).

The widespread adoption of cryptocurrencies will make the central banks' tasks challenging, particularly when it comes to reining in the plutocrat power. Sadly, actions in the metaverse are connected to cryptocurrencies, NFTs, and commemorative items produced by private companies rather than the central bank. The emergence of the metaverse may present the central bank with sophisticated challenges while carrying out its duties (Kasiyanto and Kilinc, 2022). The user's real-world identity and other sensitive information, such as position, purchasing preferences, and even financial details, might be discovered by tracking digital remnants in the social Metaverse (Wang *et al.,* 2023).

Social clone (The avatar) is one of the suggested solutions to deal with the sequestration problems in the social Metaverse. To confuse the audience that tries to stalk people in the Metaverse, this entails making numerous copies of each user in the Metaverse. Such a sequester protection scheme might solve certain issues, but by enabling users to have several Metaverse representations and millions of duplicates roaming about, it actually makes matters worse and confuses more people than just the target audience. Other privacy protection strategies include hiding users by routinely altering the avatar's look to make it more difficult for audiences to target specific persons and momentarily hiding the avatar symbol when being tracked (Wang *et al.,* 2023).

The examination of case-specific clinical data and the total abolition of physically and paper-based case records are further advantages of Metaverse. However, there are some difficulties with using the Metaverse in healthcare services, such as the potential for user lack of privacy, the high cost of this technology, disagreements between health-related associations and institutions regarding its launch, the potential for ethical issues in the use of the technology, the potential to endanger human wellbeing, the high rate of depression and violence, and the potential for having negative effects (Marzaleh *et al.,* 2022).

2. Tools and Methods

The research hypothesis is that virtual augmented and extended realities are causing more harm than good to humanity. They are adding to the artificiality of people's environments hence life, and adding more stressors will be the root cause to more health deficiencies and diseases as their former technology-based environments has caused to humanity.

The study conducts a survey on a random sample of different people and measures their attitude towards extended realities and the metaverse. And what is people's attitude towards having activities and investments in the metaverse, as well as their attitude towards parallel universes and life on other planets and SETI (Search for Extraterrestrial Intelligence) and METI (Messaging Extraterrestrial Intelligence)

The survey questionnaire had 1 main Section C and an introduction of demographic questions. First part was Demographic and Categorizing questions, which had 7 questions, from Question 1- 7. Second questionnaire section was Section C entitled: Attitude towards Extra-Natural Phenomena/ Extended Reality and the Metaverse, it was constituted by questions from no. 49- 80, with a total of 32 questions.

3. Results

The complete responses out of 48 responses were 29, of which 9 were males and 20 were females. (Fig. 2).

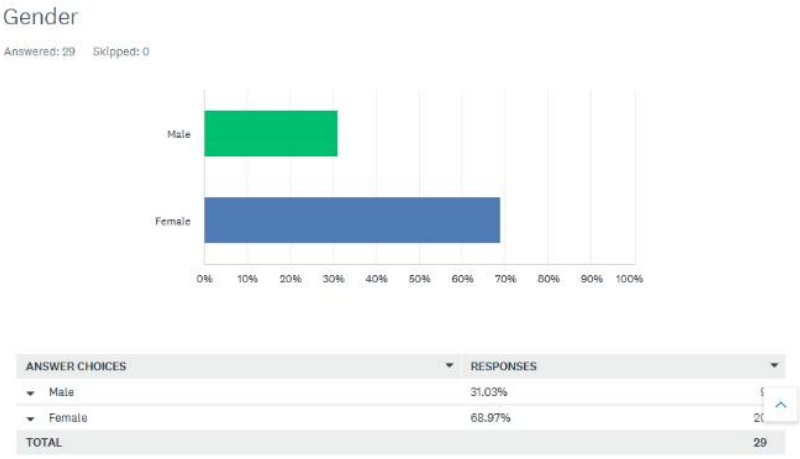

Fig. 2: Gender responses

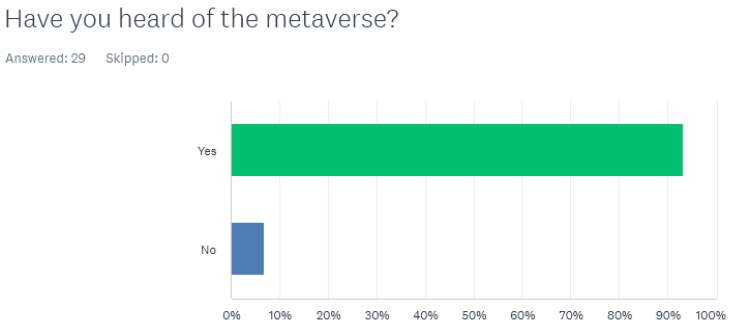

Fig. 3: Respondents' knowledge of metaverse

Around 92% (27 out of 29 person) of the respondents have already heard of the Metaverse. (Fig. 3). Of which 5 only agreed to invest in virtual currencies like bitcoin (Fig.4). 4 only agreed to invest in virtual real estate assets. 27 respondents agreed that metaverse is a threat to privacy and security by sharing a person's information and data on extended realities' platforms. (Fig. 5) While 28 respondents believed metaverse is a threat to well-being (Fig. 6).

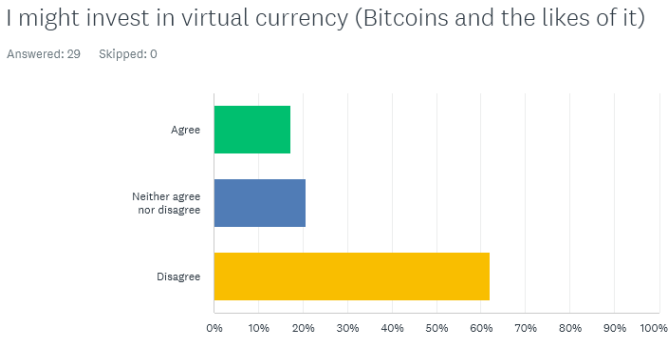

Fig. 4: Respondents' Willingness to invest in virtual currencies.

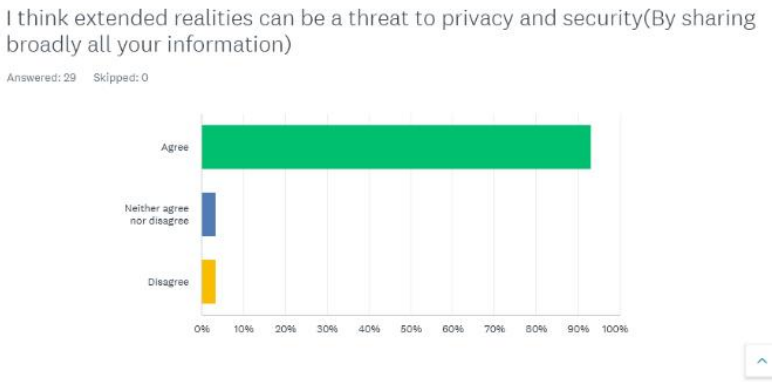

Fig. 5: Respondents' perception of Extended reality effect on privacy

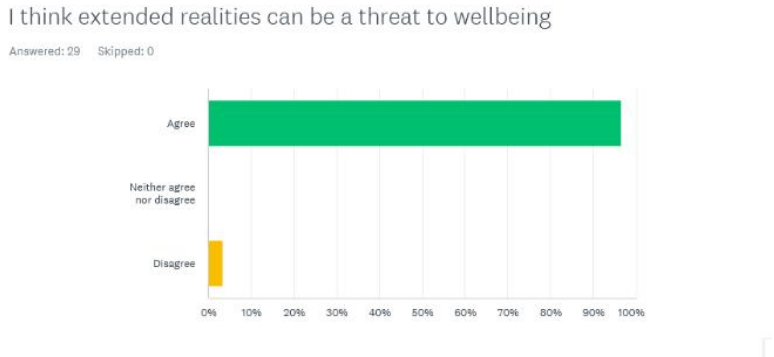

Fig. 6: Respondents' perception of Extended reality effect on wellbeing

Only 5 respondents agreed to the idea that metaverse can be a path to transcendence and human evolution (Fig. 7). Almost 80% agreed that metaverse can be a tool that leads to more stress and burnout, and 93% that it can be tool to escape reality.

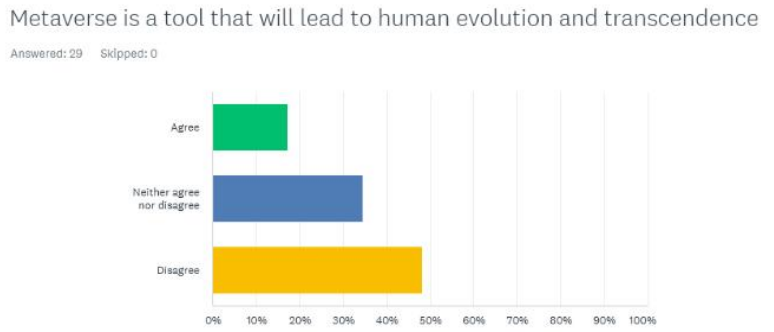

Fig. 7: Respondents' perception of metaverse and its role in human evolution

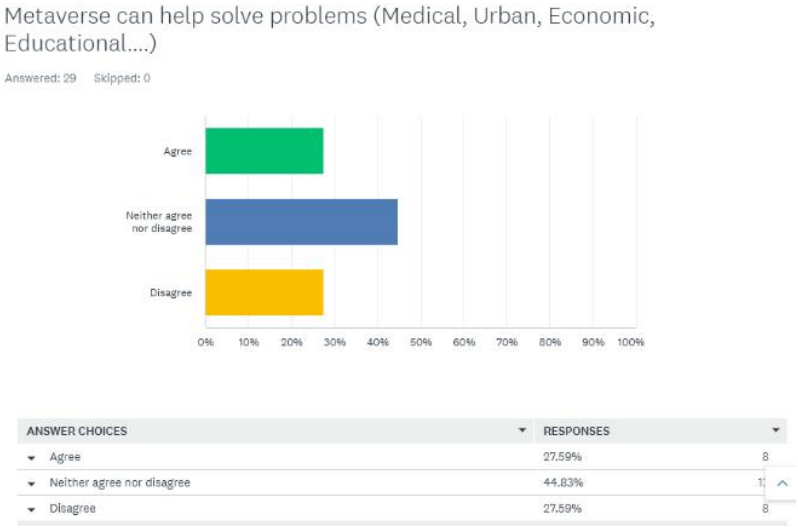

Fig. 8: Respondents' perception of metaverse and its role in better life quality

Equally 8 respondents saw that the metaverse can help solve solutions in different domains, and 8 disagreed with this idea. (Fig. 8)

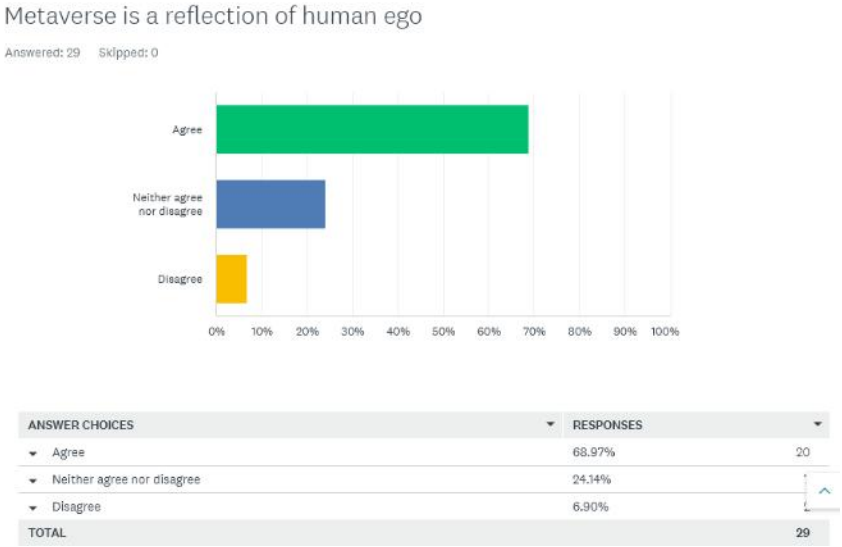

Fig. 9: Respondents' perception of metaverse and its relation to human ego

Only 10% of the respondents agreed to have a digital twin (avatar) as a concept (Fig. 10). 2 out of 29 respondents only agreed that this avatar will have their gaming information and their friends and social connections identified, as well as their virtual assets. Only 1 respondent agreed that their avatar will have access to their virtual financial data, while 82% disagreed to share their financial information with a virtual character.

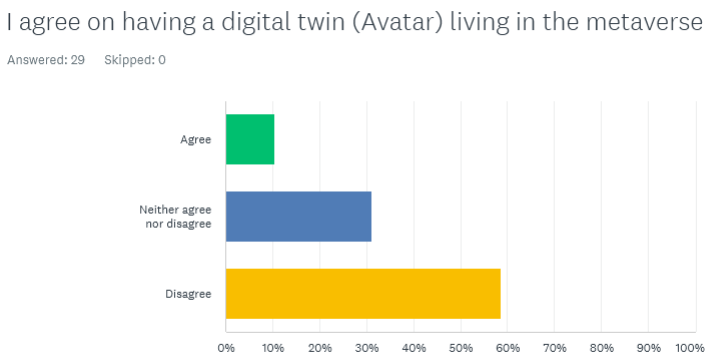

Fig. 10: Respondents' perception on having a digital twin (avatar)

About 45% of respondents did not believe the metaverse will become the new reality in the future. (Fig. 11) About 65% of respondents did not agree on investing (time, money or effort to research in SETI and METI) (Fig. 12).

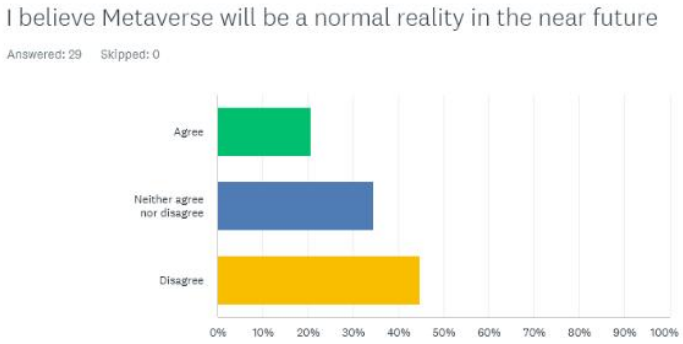

Fig. 11: Respondents' perception on the sustainability of the metaverse

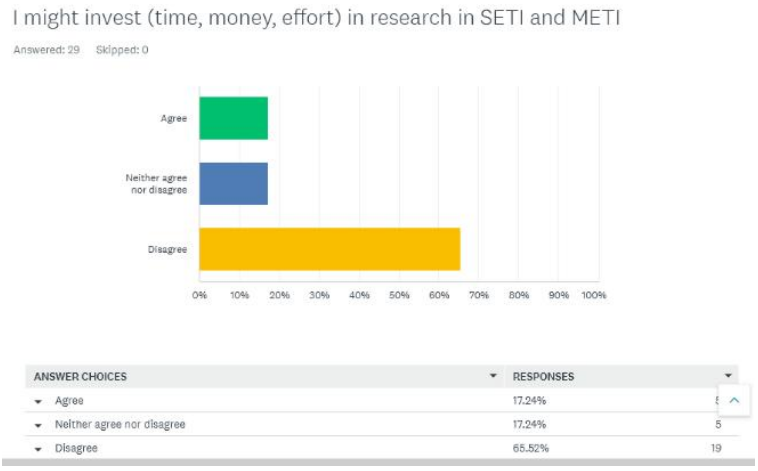

Fig. 12: Respondents' willingness in investing in SETI and METI

4. Discussion

Two propositions have been taking place in the ultramodern times, the first one is eastern and the other is western. Now the Metaverse is to be tested whether it can gather both propositions towards human evolution and take them forward to further disaffection from human nature. Eventually, the conventional order of spatiotemporal exists in the real world. The realm of " Tao" in ancient China and ancient Western surrealism have fully excluded the attributes of the spatiotemporal, which is ideal and illusory. The Metaverse lies nearly in between. Despite its hyperactive spatiotemporal nature, technicians always maintain the spatiotemporal consistency of the users' interaction. thus, there's no need to worry about the confusion of spatiotemporal caused by the Metaverse (Wang *et al.,* 2023).
Metaverse means a larger number of users, richer network, and computing power, is an important support for Metaverse. The planning of new business formats and Metaverse platform grounded on cloud computing technology have increased the demand for computing power and handed room for development of computing power. The cloud storage, cloud computing, cloud rendering other technologies used by Metaverse place high demands on customer device performance and servers' adaptability (Wang *et al.,* 2023).

The ethical and moral issues that Metaverse needs to break Integrity issues- publishing and propagating false information, fraud; Problem of inimical atmosphere; violation of intellectual property rights. With the development of Metaverse interactive technology, when the brain's knowledge can be edited, stored, and copied like computer information, the scenes in wisdom fabrication pictures may no longer be imaginative. At this point, the part of ethics becomes veritably important. The original law of ethics has been affected, and the expression of the new law of ethics is lagging before and cannot keep up with the development of the Metaverse. thus, the supervision of the Metaverse should be strengthened, and applicable laws and regulations should be formulated and streamlined in a timely manner (Wang *et al.,* 2023).

Cyber-Syndrome is a physical, social, and internal complaint caused by inordinate use of the Internet. With the nonstop development of interactive styles, electronic bias has come lower and further movable. The streamlining of outfit makes people spend further and further time on the Internet. At the same time, the Metaverse is nearly connected with the real world. The emulsion of virtual and real, and the high degree of absorption of Metaverse make the problem of cyber pattern indeed more serious (Wang *et al.,* 2023). Compatibility Challenges that will face the Metaverse, such as issues between Metaverses created by different companies. Between Metaverses and the real world (including currency issues and dealing with legal controversies) (Wang *et al.,* 2023).

5. Conclusion

Artificial intelligence and the metaverse are currently the most talked about topics in every domain. The research tried to investigate people's attitude towards the new extended realities and how people perceive having un-real environments. The results were very intriguing for they hold a lot of contradictions, with all the interest in digitizing the world, humans still have a sceptical look towards intangible and virtual things, that is clear in their lack of willingness to invest in virtual assets and travel to outer space. Most respondents also disagreed on digitizing humans. Ongoing research shall assess the situation further and indicate directions for the best use of technology extensions for the best of humanity.

Study limitations

The study was based on many wellbeing notions and criteria referring to the World health Organization questionnaire of quality-of-life WHOQOL. However, it had to cover other notions regarding the built environment and virtual environments, the scope is very rich and full of hypotheses and is a base for future research and more extended studies.

Acknowledgment

Thanks goes to all the respondents who gave their time to answer the questionnaire and gave their insights about this crucial matter in the history of human evolution.

Conflicts of interest

The author declares that there is no conflict of interest whatsoever between any of the involved parties who contributed to the completion of this research.

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